

FY19/20 CAA 103/105 Grant Funding for CA-AZ US/MX Border

Agency	Priority	Description of Action	Target Output	Lead Points of Contact	Time Period	Cost and Source
CARB		Imperial County forecast/alert website	<ul style="list-style-type: none"> Conduct air quality forecasting and alerts 	Lizzy	Continuous	\$140,000
		Mexicali PM2.5 Study	<ul style="list-style-type: none"> Continuous monitoring and periodic speciation 	Lizzy	24 months	\$400,000
		Support 2 City of Mexicali attendees to the 2020 Sensor Conference	<ul style="list-style-type: none"> training 	Fernando	One time	\$2,000
	Subtotal					\$542,000
			<ul style="list-style-type: none"> 			
CARB	1	Year around support of media campaign in Mexicali	<ul style="list-style-type: none"> Educate the community on the air quality in the region and the consequences of open burning of tires, wood, garbage, agriculture fireworks, etc. Raise the public's awareness of the consequences of open burning on air quality. Influence policy and legislation on open burning. 	Lizzy	Annual	Annual media campaign: \$100K Surveys: \$10K
	2	Revise on-road motor vehicle emissions in Baja CA	Travel demand modeling (TDM)	Lizzy	1 year	Approx. cost: Mexicali - \$35,000 Tecate - \$25,000 Tijuana - \$40,000
	3	Additional monitoring support for SPA BC in Baja CA	Updating Agilaire software	Lizzy	1 year – or continuous based on needs	Software update: \$4,500. Cost for monitoring parts and instrumentation. Dependent on types of monitors used and at how many sites.

	4	Creation of an interactive and educational game to raise awareness about air quality for school-aged children in Mexicali.	<ul style="list-style-type: none"> • Introduce basic concepts about air quality • Show how air quality is measured in AQI • Point out the natural causes of air pollution • Indicate the human sources of air pollution • Describe the health impact of polluted air • Teach the actions that can be carried out to avoid and counteract pollution. 	Lizzy	1 year	Approx. cost: \$8000
	5	Deployment of advanced fleet and emissions monitoring systems as the US-Mexico border region to improve on-road mobile sources emissions inventories on both sides of the border.	<ul style="list-style-type: none"> • Deploy 24 units of ALPRs and 6 units of PEAQS at Andrade, Calexico, Calexico East, Otay Mesa, San Ysidro, and Tecate ports of entries to continuously collect emissions data and monitor fleet characteristics. 	Sam Pournazeri	continuous	Approx. cost: \$960,000 ALPR system cost – approx. \$15,000/unit PEAQS system – Nox and PM measurement \$100,000/unit.
	6	Border Health Study: Develop an exposure assessment from multiple pollution sources in Imperial Valley and San Diego	<ul style="list-style-type: none"> • Burning – Ag burning Imperial Valley and Mexico; Wildfires; Illegal night time burning in Mexico • PM and VOCs from Mexico – Salton Sea; Border crossing traffic • Health outcomes could include: OSHPD – ER visits and hospitalization for asthma and cardiovascular 	Linda Smith	3 years	Approx cost: \$500K

			outcomes; Schools – Absences, medication usage.			
	7	Improving PM10 Emission Estimate and Dust Control Plans for Imperial County Sources	<ul style="list-style-type: none"> • Complete the development of a windblown PM10 emission inventory in the Imperial Valley • Compute the proximity, emission strength, and relative impact of emitting source areas upwind of Brawley, Westmorland, Niland, El Centro, and Calexico on selected days • Conduct a literature search and confer with source managers to identify successful windblown dust control practices in the western US 		2 years	Approx. \$400 – 450K
	8	Support airborne flux measurements along the US-Mexico border region to evaluate the emissions inventories on both sides of the border.	The exact number of regions that will be sampled and total flight hours will be contingent upon funding, but it is expected that measurements will be focused over the Mexicali/Calexico region, as well as Tijuana and north of the border (possibly as far north as San Diego).	<p>Jeremy Avis</p> <p>Team: Allen Goldstein and Ron Cohen – UC Berkeley; Halfidi Jonsson – Naval Postgraduate School; Alex Guenther – UC Irvine; Jeremy Avise & Ajith Kaduwela - CARB</p>		Approx. cost: \$1.3 million

ICAPCD		Imperial County/Mexicali Task Force and Staff Support	Staff supporting related District planning efforts		Annual	\$150,000	[EMBED Package]
	Subtotal					\$150,000	
ICAPCD		Meteorological Tower Yearly maintenance			Annual	\$45,000 \$10,000	
		RedSpira -educational game	Teach basic notions about air quality Show how air quality is measured Point out natural source of air pollution Indicate human sources of air pollution Expose health effects of air pollution How to prevent & reduce air pollution			\$2,823.93	
		Educational/Awareness Kiosks	Proposal 1: 2 Kiosks 1 Mexicali proposed			\$16,386.90 \$ 5,101.41	
			Proposal 2: 3 Kiosks Mexicali proposed			\$24,579.95	
SDAPCD		San Diego -Tijuana Task Force	Funds San Diego-Tijuana Task Force Meetings Line item in 105 grant	Bill Brick	Annual	\$5,000	
		Monitoring Equipment Teledyne T640X Met One BC 1060	San Ysidro site – T640X BC 1060	Bill Brick		\$45,000 \$15,000	
			Otay Mesa site – T640X BC 1060	Bill Brick		\$45,000 \$15,000	
		Tijuana Consulate – PM monitoring with the help of San Diego State Univ possibly wth the air district.	PM2.5 air quality monitor Annual Service Agreement	Bill Brick		\$94,077 \$19,862	
SDAPCD		Total				\$238,939	

		California				\$930,939
ADEQ		Manage Arizona-Sonora Air Quality TF	two meetings per year		Annual	
		Border Office Staffing	Partial funding for staff in ADEQ border office		Annual	